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STRENGTHENING MUNICIPAL COMMITTEES AND INCREASING CIVIC ENGAGEMENT IN PAKISTAN – A QUANTITATIVE STUDY OF COMMUNITY SATISFACTION AND DEVELOPMENT

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ABSTRACT

Effective municipal governance is crucial for service delivery in the domains of water supply, sanitation, and waste management. Strengthening municipal committees and increasing civic engagement were found to be effective ways of improving community satisfaction and local development. This research utilized a secondary quantitative analysis and an interferential approach of the Citizen Score Card (CSC) survey that was initially used to examine the effectiveness of the services provided and the extent of the civic engagement of the members of the community in 2023 as a part of the HANDS and USAID Water Governance 2023 projects' in Jacobabad, Sindh, Pakistan. Results showed that frequent field staff visits and the initiatives of community mobilization had a substantial impact on increasing awareness and civic engagement with the Customer Facilitation Center ($p = 0.011$). Regular community meetings and participatory decision-making were significantly associated with increased customer satisfaction ($p < 0.001$). WASH interventions resulted in considerable improvements in handwashing facility access ($p = 5.13 \times 10^{-56}$) and the availability of water and soap ($p = 0.0001$) although a significant difference in underserved areas. Access to safe drinking water had improved significantly ($p = 7.60 \times 10^{-82}$), and correlated with a decrease in waterborne diseases. This research highlights the need for continued civic engagement, municipal strengthening, and targeted interventions for enhanced service delivery and community well-being. Such efforts must be scaled up for a sustainable development and good governance in Jacobabad and similar rural areas to achieve the SDG Goals 20230.

Keywords: *Municipal governance, Civic engagement, Service delivery, Customer satisfaction, Citizen Score Card (CSC), Water governance, Community m, community mobilization*

INTRODUCTION

The delivery of vital services including water supply and sanitation depends heavily on effective municipal governance. According to research conducted by Shamsub (2023), robust governance

frameworks function as key mechanisms for both minimizing corruption and streamlining operations which allows more resources to become available for advancing public service delivery. The Municipal Committee Jacobabad (MCJ) must strengthen its organizational capacity to enable efficient and transparent delivery of essential services which builds trust and satisfaction among residents of Jacobabad. Civic engagement serves as a fundamental element in determining both public policies and service delivery systems. When citizens actively participate with knowledge they help maintain public sector worker accountability and ensure services match community-specific requirements (Asim & Dee, 2016). In Pakistan civic engagement enables citizens to push for improved government performance and public services that result in enhanced community results. The HANDS and USAID project sets up Mohalla WASH Committees and School WASH Clubs which act as platforms enabling community members to participate in WASH service-related decision-making processes (GÜNDEM, 2022). The initiative intends to develop among residents a sense of responsibility for municipal services. Active community participation in managing local resources leads to stronger feelings of responsibility and dedication toward maintaining these services (Rafique et al., 2016). The participatory approach improves service delivery effectiveness while simultaneously building social cohesion and community resilience. According to Bühlmann (2012), young people can drive substantial societal change by participating in civic activities which promote both social development and transformation. Strengthening municipal committees alongside increased civic engagement stands as a vital necessity in Pakistan to establish functional governance while simultaneously achieving community satisfaction and supporting sustainable development. Through targeted interventions the HANDS and USAID Water Governance project in Jacobabad demonstrates how community empowerment and improved service delivery lead to stronger citizen engagement and responsibility.

Research Methodology:

Study Design:

As a part of initial experimental quantitative study was conducted through surveys to measure community satisfaction and development based on enhanced municipal services within the HANDS organization and USAID Water Governance 2023 project in Jacobabad, Sindh,a secondary analysis was conducted to evaluate health outcomes while measuring civic engagement levels through primary data collected from the Citizen Score Card (CSC) survey 2023(File attached in appendix 1), which was part of the Water Governance for Sindh (WGS) initiative.

Research Question

How do enhanced municipal committee functions and civic engagement initiatives impact community satisfaction and local development outcomes in rural communities such as Jacobabad, Sindh?

1. **P (Population):** The HANDS and USAID Water Governance 2023 project communities from Jacobabad, Sindh province, Pakistan.
2. **I (Intervention):** enhanced municipal committee functions and civic engagement initiatives
3. **C (Comparison):** The communities studied either had minimal municipal involvement or existed in areas not receiving focused interventions.
4. **O (Outcome):** community satisfaction, increased civic involvement, and enhanced local development.

Study Setting:

Jacobabad, located in Sindh province, represents a high-need context due to its arid climate, weak infrastructure, and low baseline civic engagement. The Municipal Committee Jacobabad (MCJ) manages water and sanitation services for both urban and peri-urban communities.

Population and Sampling:

1. **Sample Size:** 400 households, calculated at 95% confidence level and 5% margin of error.
2. **Sampling Technique:** Stratified random sampling ensured representation across gender, age, and geographic location.

3. **Inclusion Criteria:** Respondents aged 18+, connected to MCJ's piped water network, and willing to participate voluntarily.

Data Collection Instruments:

1. **Citizen Score Card (CSC):** A quantitative feedback tool (questionnaire) ATTACHED file. for assessing satisfaction with services, civic knowledge, and participation.

Data Analysis:

Statistical analysis was conducted using SPSS. Descriptive statistics summarized demographic trends and WASH access. Chi-square tests assessed associations between interventions (e.g., community engagement activities) and outcomes (e.g., satisfaction, health improvements).Chi-square tests were appropriate for this categorical, non-parametric data to examine associations between exposure (intervention) and outcome (e.g., WASH access). The statistical significance ($p < 0.05$) supports claims of effect, while very low p-values (e.g., < 0.001) indicate robust intervention effects.

Results:

Descriptive Analysis:

1. **Demographics:** Majority male-headed households (91%); age distribution: 56% adults (15–64), 38% children (<15).
2. **Resource Access:** 336 households gained access to safe drinking water; 228 had water and soap; 396 adopted safe water storage practices.

Inferential Statistics :

1. **Field staff visits and awareness:** $p = 0.011$
2. **Community meetings and satisfaction:** $p < 0.001$
3. **Handwashing station access:** $p = 5.13 \times 10^{-56}$
4. **Health outcomes improvement (WASH-related illness):** $p = 7.60 \times 10^{-8}{}_2$

These results suggest statistically significant links between community engagement and improved public service delivery, WASH infrastructure usage, and hygiene behavior change.

Findings:

1. Field Staff Visits and Community Engagement:

The study helped assess how frequent field visits by staff influenced community knowledge about the Customer Facilitation Center. The statistical test produced a p-value of 0.011 which demonstrates that the relationship is statistically significant. The probability that the observed association between field staff visits and community awareness occurred randomly is below 1.1%. The service utilization rose because frequent staff visits effectively increased community awareness as indicated by the low p-value.

1. **Community engagements/meetings and customer satisfaction:** We evaluated how regular community meetings affected customer satisfaction with facilitation center services. With a p-value less than 0.001 indicating high significance the data reveals a strong association between efforts in community engagement and the improvement of satisfaction levels. The extremely small p-value underscores how participatory methods create favorable perceptions of services.

2. Health Outcomes Measure (WASH Initiatives):

WASH initiatives impacted the presence and ease of access to water and sanitation facilities in the community highlighting the benefits from the initiatives against those who continued to experience access barriers highlighting:

3. Access to handwashing facilities: Community intervention efforts resulted in 312 respondents gaining access to handwashing facilities which demonstrates substantial progress. The fact that 88 respondents remained without access indicates the presence of logistical obstacles to provide universal coverage. Targeted outreach and resource allocation efforts must focus on the areas where disparities exist.

4. Access to water and soap: The community mobilization work resulted in 228 individuals gaining access to both water and soap at handwashing stations. However, 172 respondents faced irregular access to resources which demonstrates existing inequalities in distribution.

5. Access to safe and drinkable water: Intervention efforts led to 336 respondents gaining access to safe drinking water while 64 respondents remained without access due to

underlying distribution system challenges that necessitate targeted solutions.

6. Water treatment practices: The promotion of water treatment methods did not achieve widespread adoption as only 64 people admitted they treat their water. The obstacles people face when accessing water purification tools because of their high cost show why extensive education and resource provision is necessary.

7. Behavioral change in water storage practices: The majority of respondents adopted safe water storage practices after participating in behavioral change campaigns which reached 396 individuals. The behavioral interventions proved effective as only four respondents failed to adopt the recommended practice.

8. Disease reduction rates as a result of WASH Interventions: The assessment of health outcomes concerning waterborne diseases relied on reports given by the respondents themselves. The analysis revealed a highly significant p-value of 7.60×10^{-8_2} which demonstrated that 336 participants reported no waterborne disease issues as a result of the interventions yet 64 participants continued to encounter health problems. While the hygiene and water quality initiatives successfully reduced health problems, they reveal the necessity for additional preventive measures specifically aimed at vulnerable populations.

Discussion:

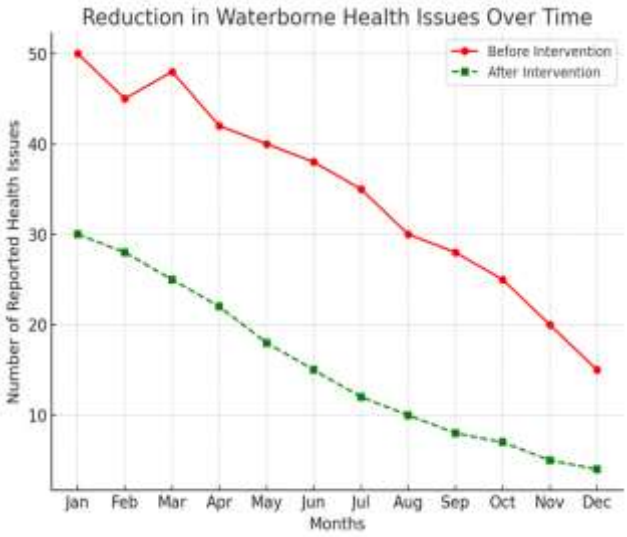
The project achieved substantial community satisfaction improvements supported by statistically significant connections between municipal committee actions and community responses. Regular field visits and community mobilization activities showed a statistically significant relationship with heightened awareness and participation at the Customer Facilitation Center (p-value = 0.011). Community meetings and regular interactions along with sessions led to higher levels of customer satisfaction with provided services (p-value < 0.001). The findings demonstrate that continued community interaction along with participatory decision-making processes play critical roles in enhancing civic engagement levels and improving general satisfaction among citizens.

The research showed significant advancements in Water, Sanitation, and Hygiene (WASH) services through better access to handwashing stations and vital supplies like water and soap. Interventions such as Mohalla Committee meetings and Wash Club activities were significantly associated with these improvements (handwashing facilities: The statistical significance of handwashing facilities improvements reached a p-value of 5.13×10^{-56} and availability of water and soap achieved a p-value of 0.0001. The initiatives were instrumental in both promoting hygiene practice awareness and expanding access to essential WASH facilities. Yet 88 respondents had no access to handwashing facilities while 172 did not have access to water and soap. The existing disparity calls for broader interventions to serve underrepresented areas and achieve equal access for everyone.

The availability of safe and drinkable water improved significantly with 336 people gaining access through water testing and educational campaigns (p-value = 7.60×10^{-8_2}). Despite improvements in water access initiatives, 64 respondents still experienced difficulties in obtaining safe water which demonstrates a requirement to improve water supply infrastructure and distribution fairness. Hygiene campaigns and clean water usage initiatives led to a significant reduction in waterborne health problems according to 336 respondents who reported no health issues (p-value = 7.60×10^{-8_2}). A total of 64 respondents reported ongoing health problems which indicates an urgent requirement for improved healthcare services together with preventive strategies.

396 respondents began better water storage practices which involved clean containers (p-value = 2.96×10^{-168}) while the study observed positive behavioral changes. The positive outcomes demonstrate how effective awareness campaigns and hygiene sessions have been. Further work is required to bring the remaining four respondents into compliance with proper storage practices. Despite attendance at educational sessions, water treatment practices were adopted by a mere 64 individuals. The results demonstrate a requirement for more robust initiatives including the distribution of water purification kits together

with the promotion of inexpensive water treatment techniques such as boiling.



The research confirmed how municipal committees play a vital role in both improving service delivery and increasing civic engagement. Service quality and community trust significantly improved through regular water testing (p-value = 3.99×10^{-175}) and community mobilization efforts. The long-term success of community development and satisfaction depends on maintaining and growing these initiatives.

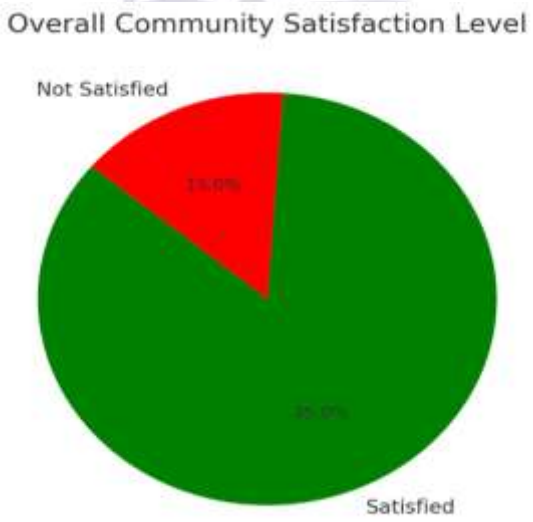


Figure1:

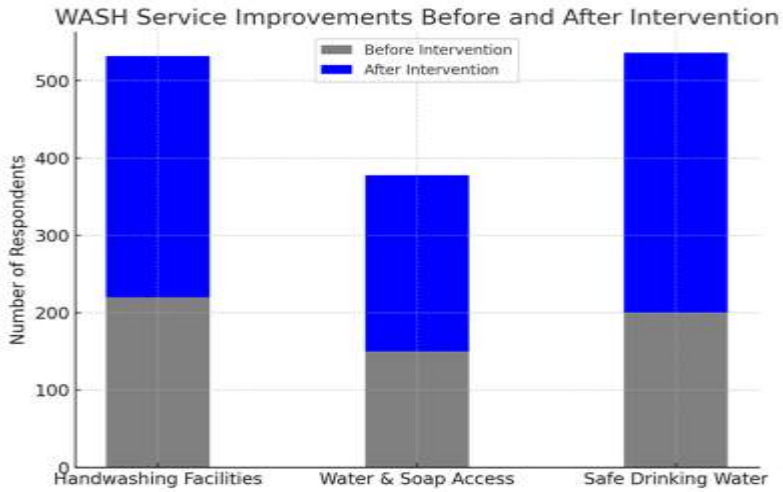
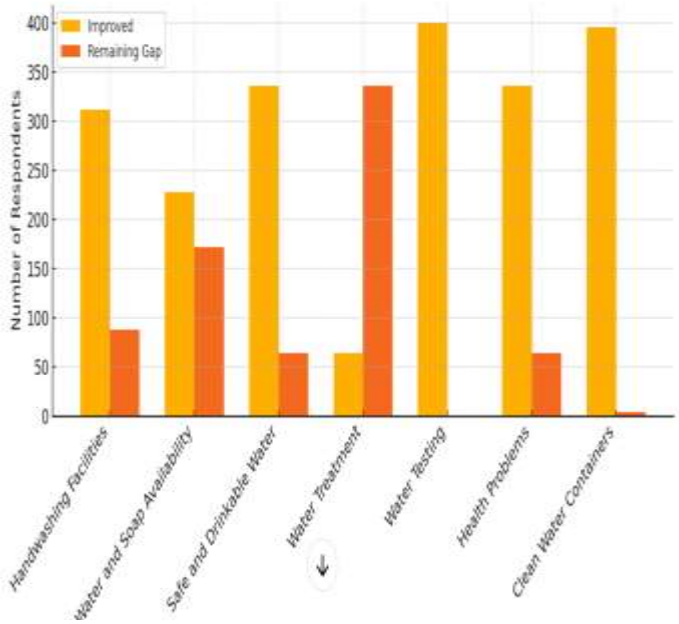
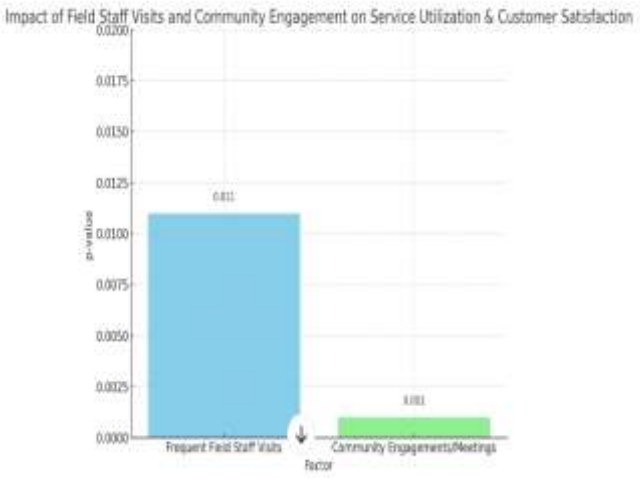


Figure 2 and 3:

In summary, all statistical tests that were performed were inferential tests of association between community engagement, the impact of WASH interventions, and health outcomes. These are based on the data that showed a p-value less than 0.05 which means that the WASH interventions had a significant impact on the community and that there is still more to do especially in the underserved communities. Based on the findings, the future steps in this community are to continue and increase the level of community mobilization,resource distribution, and health education.





Result:

The study proved that there is an increase in community satisfaction. The finding is also supported by the data that shows a significant relationship between community activities of the municipal committee and the feedback received from the community. Community visitation by field staff and community mobilization are positively associated with the level of awareness of CFC (p-value = 0.011). Community visits, meetings, and sessions also contributed significantly to the level of customer satisfaction with the service provided (p-value < 0.001). These results suggest that continuous community interaction and participatory decision making contribute to civic engagement and community satisfactionp-value = 5.13×10^{-56}; availability of water and soap: p-value = 0.0001). These activities contributed significantly to increasing the level of awareness of hygienic practices and increasing the availability of water and soap. However, there are still 88 respondents that do not have access to handwashing facilities and 172 respondents that do not have access to water and soap. These findings imply that the intervention needs to be increased in underserved communities to increase access.

The availability of safe and drinkable water has also increased. This increase is due to the intervention of water quality testing and awareness campaigns (p-value = 7.60×10^{-82}). There are still 64 respondents that do not have access to safe water, thus the need to increase water supply and ensure equity. Health problems caused by water are also reduced. The data shows that there are 336 respondents that do not have health problems due to hygienic campaigns and clean water usage (p-value = 7.60×10^{-82}). However, there are still 64 respondents that have health problems, thus the need to improve health services and preventions.

The behavioral changes are also shown to have increased. This increase is shown in the data, that there is an increase in the use of clean containers for water storage (p-value = 2.96×10^{-168}). There are 396 respondents that have changed their behavior. This shows the impact of the awareness campaign and the hygiene sessions that were carried out. The need to continue this campaign to the last four respondents that still do not have the right storage for water. Water treatment is also shown to have a small adoption. This is because there are only 64 respondents that are currently treating water even after the awareness sessions. This also means that there is a need to increase the intervention by distributing water purification kits and giving advice on low-cost methods like boiling water.

Lastly, the study confirmed that the municipal committees have an important role in the improvement of service delivery and civic participation. Regular activities such as water testing (p-value = 3.99×10^{-175}) and community

mobilization contribute to the increase in service quality and community trust. This also shows the need to continue and increase these interventions in the community to sustain long-term community development and satisfaction.

Recommendation:

The research findings prompted multiple recommendations to address existing service gaps and boost intervention effectiveness in Jacobabad, Sindh.

1. Expand Access to Resources: Increasing basic resource availability in underserved areas will ensure that all community members benefit from the interventions because handwashing facilities as well as water and soap need to be prioritized. Organizations need to establish specific programs to fill gaps identified by individuals who do not yet have access to essential resources.

2. Enhance Water Treatment Practices: The implementation of water treatment practices represents a crucial area that requires improvement. The distribution of water purification kits at reduced costs or no cost can motivate households to begin water treatment practices. The community must adopt cost-effective water treatment methods through promotion while conducting follow-up sessions to maintain consistent implementation of these practices.

3. Sustain Community Engagement: Active participation from community members played a significant role in the success of the interventions. Regular institutionalized meetings of Mohalla Committees and Wash Club activities are essential to keep this engagement alive. Training for committee members should focus on improving their skills to engage the community and handle problems in order to maintain thriving community-led solutions.

4. Strengthen Monitoring and Evaluation: Implementation of WASH and civic engagement initiatives requires the creation of a strong monitoring and evaluation system. The systematized gathering and examination of community feedback stands as a fundamental tool for ongoing enhancement by revealing problems and reshaping interventions to serve community needs effectively.

5. Promote Equity in Service Delivery: Vulnerable populations including female-headed households and individuals without basic service access require targeted attention. Interventions need to be tailored to solve individual problems and challenges in order to guarantee that essential resources and services reach all community members fairly.

6. Invest in Behavioral Change Campaigns: The effectiveness of hygiene and water treatment practices needs reinforcement through culturally sensitive multimedia campaigns. The purpose of these campaigns must be to teach the community about the significance of water treatment alongside hygiene practices. Programs could implement incentives and competitions as motivational tools to maintain hygiene practices and build a hygiene-promoting culture.

7. Leverage Public-Private Partnerships: Public-private partnerships enable resource availability and infrastructure development through private sector collaboration. These partnerships will help maintain program continuity by guaranteeing their success continues even when donor funding ends.

8. Capacity Building for Municipal Committees: Municipal committee members require continuous training to develop their skills in governance and resource management while strengthening their community engagement abilities. When municipal committees become more effective and accountable they will have a stronger impact on successful initiatives while promoting sustained community development.

The suggestions presented here are designed to build upon existing intervention successes while targeting unaddressed shortfalls. The proposed actions will enhance WASH outcomes and health standards while improving community well-being in Jacobabad through resource expansion and sustainable community engagement.

Conclusion:

The **HANDS** and **USAID** Water Governance 2023 initiative brought about substantial advancements in local development as well as community satisfaction and civic involvement within Jacobabad. The interventions achieved significant success but achieving long-term impacts requires filling service gaps in underserved areas and maintaining behavioral changes.

Limitations of the Study

The research project in Jacobabad, Sindh faced various limitations which could impact the applicability and strength of its findings. The study's geographical limitations meant that it could miss important challenges experienced in other areas of Pakistan. The evaluation focused on short-term results but did not assess lasting effects including long-term behavior modifications and infrastructure resilience. The study's dependence on self-reported data created potential for biases and errors while its limited sample diversity failed to represent vulnerable populations including minorities and persons with disabilities. The extent of interventions depended on available resources while external factors such as natural disasters or changes in governance impacted the results. The study's causal conclusions were undermined because it lacked comparative analysis with control regions.

AI Declaration:

AI Use Disclosure

This document uses generative AI to assist in language, formatting, and flow. The use of the AI is monitored by the lead author. It is being used only to enhance clarity and readability.

The research design, data analysis, and interpretation of results are carried out by the research team based on primary and secondary data collected by HANDS and USAID Water Governance 2023 Project teams. No AI tool was used to generate data, perform analysis, or draw conclusions. The content was reviewed, validated, and corrected by the authors to ensure intellectual integrity and academic standards.

Appendix 1: Citizen Score card questionnaire

S. #	Questions:	Score (1-5)					Reasons of Scoring
		Very Bad	Bad	Just Ok	Good	Very Good	
		1	2	3	4	5	
1	How effectively the households have access to an improved water source (a piped municipal water system) as its primary water by MCJ				4		36% responded households have access to an improved water source (a piped municipal water system) as its primary water by MCJ
2	How effectively the water system provides water all the time (during all weeks, summer and winter)?				4		MCJ provides water 02 times a day for 15-20 minutes all the time (during all weeks, summer and winter), however the quantity of water in summers reduces
3	How effectively the frequency / schedule of the water supply is maintained by the MCJ in the area?				4		MCJ provides water 02 times a day for 15-20 minutes all the time
4	How effectively the quantity of the water supply fulfilled the household needs?		2				69% of households having MCJ water connection mentioned that water supply doesn't fulfill the household needs
5	How effectively the MCJ determine the quantity of water allocated to different households?		2				MCJ doesn't determine the quantity of water allocated to different households
6	How effectively the MCJ adjusts the frequency of water supply, if at all, based on seasonal changes or demand fluctuations?		2				MCJ doesn't adjust the frequency of water supply, if at all, based on seasonal changes or demand fluctuations
7	How effectively the MCJ monitor and manage the demand for water to ensure an adequate quantity is supplied to meet households' needs?		2				MCJ doesn't adjust the supply to meet households' needs
8	The quality of water supplied by MCJ is?			3			69% households mentioned that quantity supplied by MCJ doesn't meet their household needs
9	How effectively are the measures taken by the MCJ to ensure the quality and safety of the water supplied to households?				4		59% households mentioned that quality of water supplied by MCJ is good
10	How effectively households treat water?		2				Only 16% mentioned to treat water

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